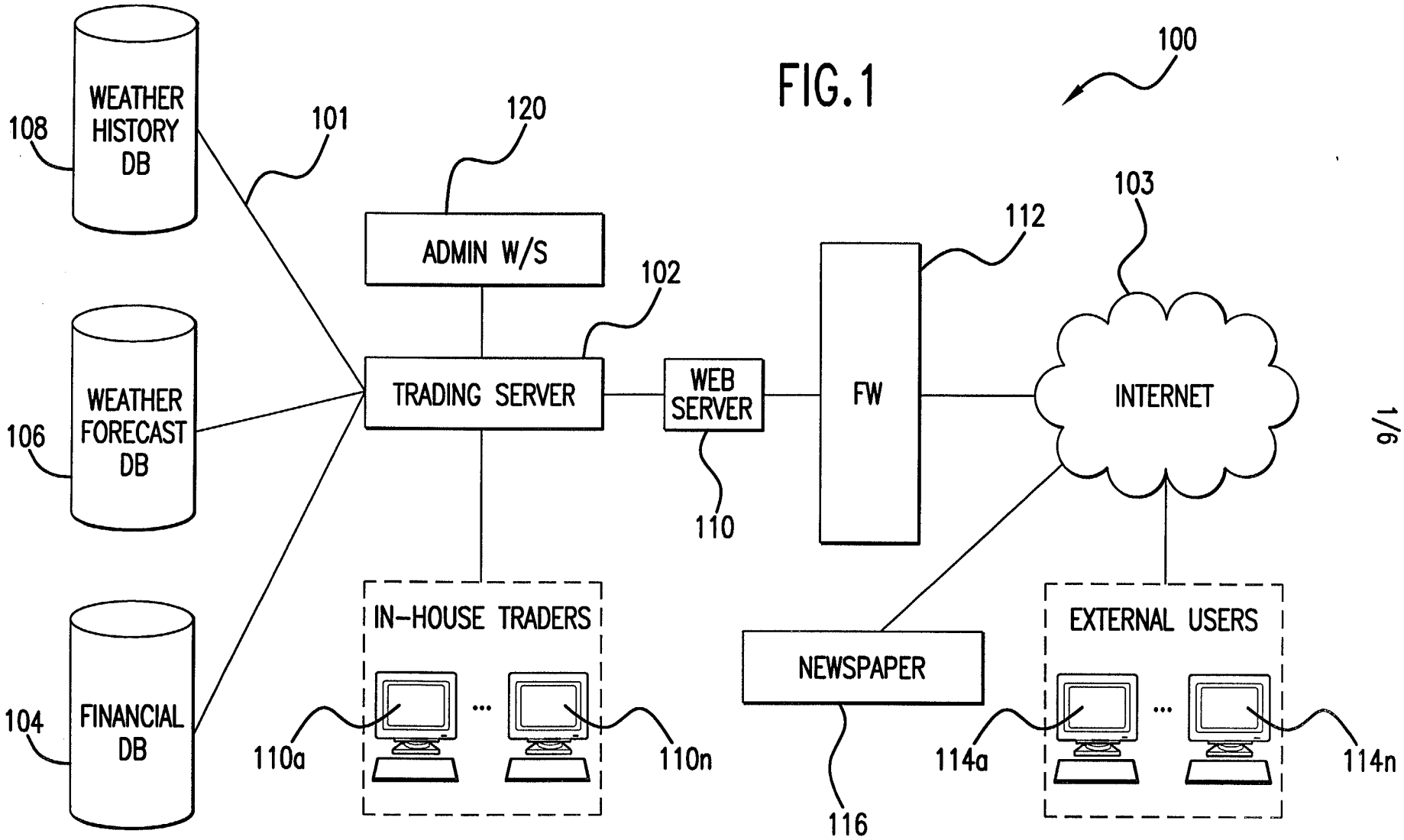

FIG.1

WEATHER HISTORY 108

YEAR	MA	DATA TYPE	P1	P2	P3	P4	P5	P6
1994	MSA 100	TEMP. SEA	46	47	50	51	54	55
1995	MSA 100	TEMP. SEA	46	47	49	51	53	55
1994	MSA 100	SNOW. SEA	0.7	0.2	0.2	0.1	0	0.1
1995	MSA 100	SNOW. SEA	0.8	0.2	0.2	0.1	0	0
1994	MSA 100	PREC. SEA	1.01	1.03	1.08	1.1	1.12	1.1
1995	MSA 100	PREC. SEA	1.01	1.03	1.07	1.1	1.12	1.1
1994	MSA 100	SNOW	0	0	0	0	1.2	0
1995	MSA 100	SNOW	0	0	0	0	0	0
1994	MSA 100	PREC	1.5	0.4	0.9	1.3	1.7	0.3
1995	MSA 100	PREC	1.1	0.01	2.68	1.78	0.48	0.01
1994	MSA 100	TEMP	49	43	45	47	50	42
1995	MSA 100	TEMP	53	51	56	50	58	54
1994	MSA 100	TEMP. CAT	1	−1	−1	−1	−1	−1
1995	MSA 100	TEMP. CAT	1	1	1	0	1	−1
1994	MSA 100	PREC. CAT	1	−1	−1	1	1	−1
1995	MSA 100	PREC. CAT	1	−1	1	1	−1	−1

202
203
204
205

FIG.2

YEAR	MA	DATA TYPE	P1	P2	P3	P4	P5	P6
N+1	MSA 100	SNOW	0.9	0.4	0.3	0.2	0	0
N+1	MSA 100	PREC	1.1	1.05	1.05	1.00	1.15	1.2
N+1	MSA 100	TEMP	48	49	50	53	55	57
N+1	MSA 100	TEMP. CAT	1	1	1	1	1	−1
N+1	MSA 100	PREC. CAT	1	1	−1	−1	1	1
N+1	MSA 100	SNOW. CAT	1	0	0	1	0	0
N+1	MSA 100	SNOW. SEA	0.8	0.4	0.3	0.1	0	0
N+1	MSA 100	PREC. SEA	1.00	1.03	1.06	1.05	1.10	1.1
N+1	MSA 100	TEMP. SEA	47	47	49	52	54	55

302

304

WEATHER FORECAST DATA 106

FIG.3

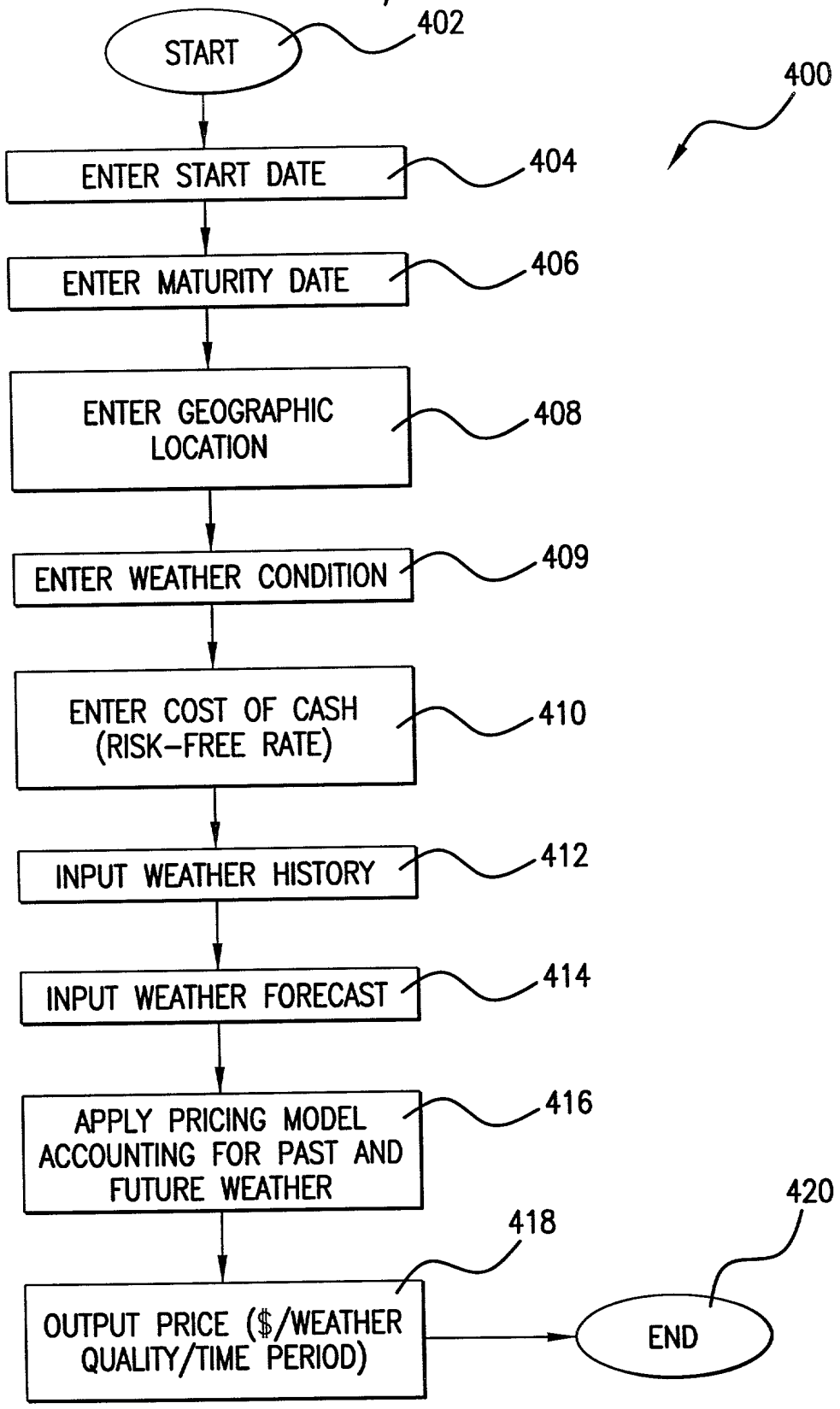
START
402
400
ENTER START DATE
404
ENTER MATURITY DATE
406
ENTER GEOGRAPHIC LOCATION
408
ENTER WEATHER CONDITION
409
ENTER COST OF CASH (RISK-FREE RATE)
410
INPUT WEATHER HISTORY
412
INPUT WEATHER FORECAST
414
APPLY PRICING MODEL ACCOUNTING FOR PAST AND FUTURE WEATHER
416
OUTPUT PRICE ($/WEATHER QUALITY/TIME PERIOD)
418
END
420

FIG.4

OPTIONS PRICING MODEL

Call Option Price $ 4,486

510

D2=D1-SIGMA*SQUARE ROOT OF T (49.43)

$-R^*T$	(0.03)
E^{RT}	0.97

INPUTS		CALCULATIONS			508
ENTER START DATE	11/1/98		MONTHS		DAYS
ENTER MATURITY DATE	11/30/98	TIME TO MATURITY	1	(T)	29
SELECT FORECASTING METRO AREA		CALCULATION FOR D1	32.18	D_1	
LOS ANGELES(LONG BEACH)		CALCULATION FOR D2	(49.43)	D_2	
NEW YORK(LA GUARDIA)		EXPONENTIAL FUNCTION (GIVEN)	2.7183	(e)	
CHICAGO					
PHILADELPHIA					
DETROIT					
WASHINGTON					
BOSTON(LAWRENCE-SALEM)					

506

502

ENTER SEASONAL HDD	456	(S)	STOCK
ENTER FORECAST HDD	366	(K)	STRIKE

504

ENTER INTEREST RATE	3%	(R)
ENTER HDD STANDARD DEVIATION	83.00	SIGMA
CUMULATIVE STANDARD NORMAL DISTRIBUTION	14%	(N)

D_1= (#2 + #5)
BELOW, CALCULATION OF D_1

#1	S/K	1.245901639
#2	Ln(s/k)	0.219859476
#3	r	3%
#4	$SIGMA^2/2$	3444.5
#5	$(r + SIGMA^2/2)^T$	2,625.58
#6	TOP HALF OF EQUATION	2,625.80 TOP
#7	STANDARD DEVIATION* sqr ROOT T	81.60494266 BOTTOM
#8	CALCULATION OF D_1	32.18

NORMAL DISTRIBUTION-NEED TO IDENTIFY MEAN AND STANDARD DEVIATION

STANDARD DEVIATION	83.00
MEAN	456
X	366
NORMAL DISTRIBUTION	0.139107661

FIG.5

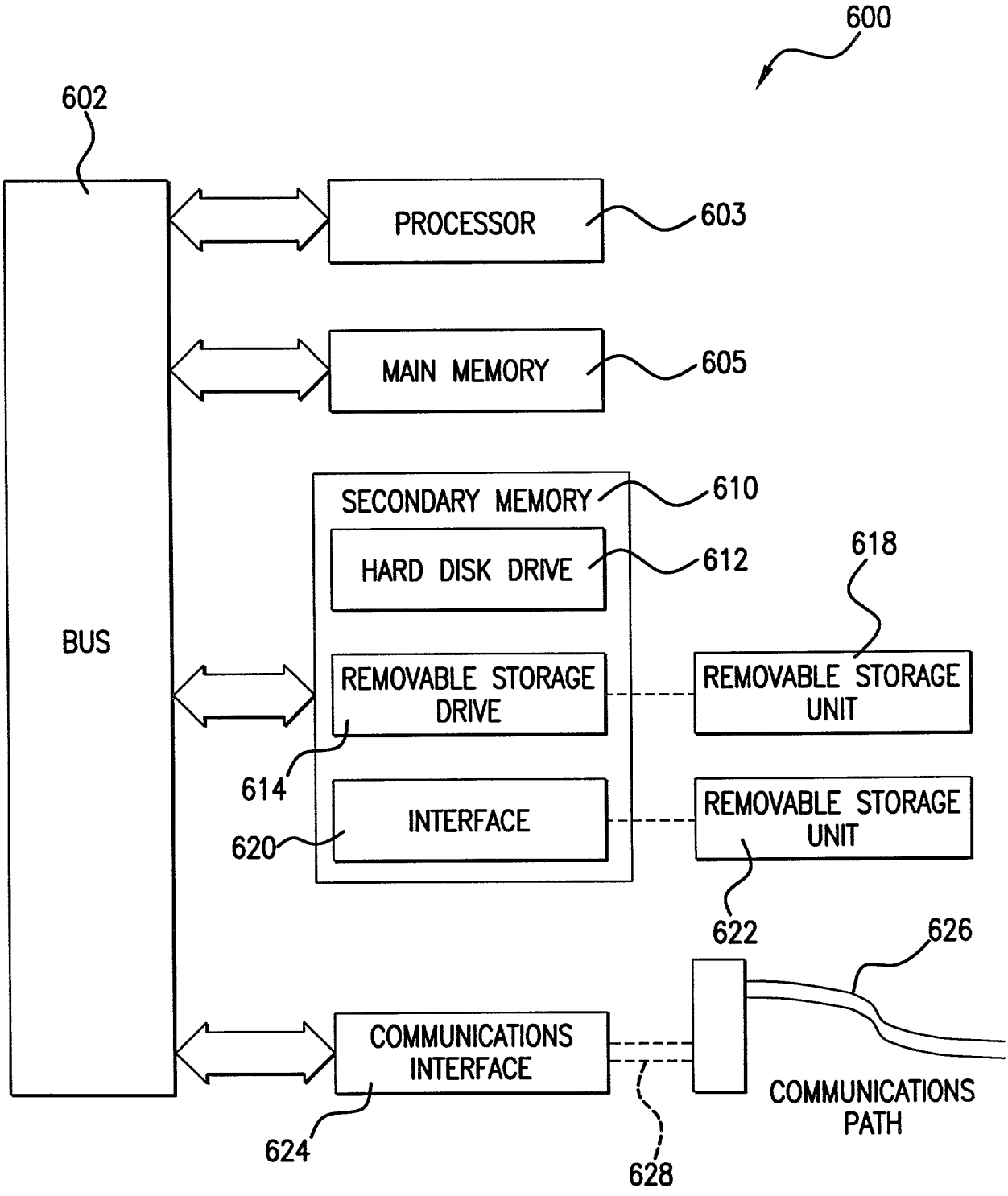
600
602
PROCESSOR
603
MAIN MEMORY
605
SECONDARY MEMORY
610
HARD DISK DRIVE
612
618
BUS
REMOVABLE STORAGE DRIVE
REMOVABLE STORAGE UNIT
614
INTERFACE
620
REMOVABLE STORAGE UNIT
622
626
COMMUNICATIONS INTERFACE
COMMUNICATIONS PATH
624
628

FIG.6